ORDER NO. 2011-XXXX-DWQ NPDES NO. CAGXXXXXX

### ATTACHMENT G - NOTICE OF INTENT

# **RECEIVED**

## WATER QUALITY ORDER NO. 2011-XXXX-DWQ GENERAL PERMIT NO. CAG XXXXXX

MAR 0 3 2011

DIVISION OF WATER QUALITY

FOR RESIDUAL PESTICIDE DISCHARGES TO WATERS OF THE UNITED STATES  FROM VECTOR CONTROL APPLICATIONS			
I. NOTICE OF INTENT STATUS (	· · · · ·		
Mark only one item 🛭 A. New Appl	icator 🗆 B. Change of Inform	ation: WDID#	_
□C. Change	of ownership or responsibility:	WDID#	
II. DISCHARGER INFORMATION			
A. Name			
Alameda County Mosquito 46	stement District		
B. Mailing Address			
23187 Connecticut Str	eet		
C. City	D. County	E. State	F. Zip Code
Hayward	Alameda	CA	94545
G. Contact Person	H. Email address	I. Title	J. Phone
John R. Rusmisel	acmod@mosquitoes.org	Nistrict manager	610)783-7744
III. BILLING ADDRESS (Enter Information <u>only</u> if different from Section II above)			
A. Name			
B. Mailing Address			
C. City	D. County	E. State	F. Zip Code
G. Email address	H. Title	I. Phone	•
		•	

# GENERAL NPDES PERMIT FOR RESIDUAL PESTICIDE DISCHARGES FROM VECTOR CONTROL APPLICATIONS

IV. RECEIVING WATER INFORMATION

ORDER NO. 2011-XXXX-DWQ NPDES NO. CAGXXXXXX

A. Pesticide residues discharge to (check all that apply)*:	
Canals, ditches, or other constructed conveyance facilities owned and controlled by Discharger.     Name of the conveyance system:	
2. Canals, ditches, or other constructed conveyance facilities owned and controlled by an entity other than the Discharger.  Owner's name: Vavids, but includes Alameda County & 14 cities within County  Name of the conveyance system:  All constructed water conveyance facilities in  Alameda County  3. Directly to river, lake, creek, stream, bay, ocean, etc.	,
図 Name of water body: <u>All waterways in Mameda County</u> * A map showing the affected areas for items 1 to 3 above may be included. See PAP for MAP	
B. Regional Water Quality Control Board(s) where application areas are located	
(REGION 1,2)3, 4,5)6, 7, 8, or 9): Region <u>2 4 S</u> (List all regions where pesticide application is proposed.)	一
	Ż
V. PESTICIDE APPLICATION INFORMATION	
A. Target Organisms: X Vector Larvae X Adult Vector	P
B. Pesticides Used: List Name and Active ingredients See PAP i Annual Witzee altached	
C. Period of Application: Start Date January 1, 2011 End Date December 31, 2011	T
D. Types of Adjuvants Added by the Discharger:	
VI. PESTICIDES APPLICATION PLAN	ス
A. Has a Pesticides Application Plan been prepared?* ☑ Yes □ No	
If not, when will it be prepared?	T
* A copy of the PAP shall be included with the NOI.	
B. Is the applicator familiar with its contents?	
🗵 Yes 🗆 No	
VII. NOTIFICATION	<del></del>
Have potentially affected governmental agencies been notified? ☑ <sup>Yes</sup> □ No รัพยโร่อาตอบร เมริก th is NOI	
* If yes, a copy of the notifications shall be attached to the NOI.	

# GENERAL NPDES PERMIT FOR RESIDUAL PESTICIDE DISCHARGES FROM VECTOR CONTROL APPLICATIONS

ORDER NO. 2011-XXXX-DWQ NPDES NO. CAGXXXXXX

VIII. FEE			
Have you included payment of the filing 口 Yes 冥 NO	fee (for first-time enrollees only) with this s □ NA We have received covific Jamount of fee - Aease S	submittal? Fing answers on the	
IX. CERTIFICATION			
supervision in accordance with a sy the information submitted. Based o persons directly responsible for gath knowledge and belief, true, accurate false information, including the poss	nis document and all attachments were prestem designed to ensure that qualified person my inquiry of the person or persons who hering the information, the information subse, and complete. I am aware that there are sibility of fine or imprisonment. Additionally ag and implementing a monitoring program	sonnel properly gather and evalue manage the system, or those mitted is, to the best of my e significant penalties for submitting, I certify that the provisions of the	ng
X. FOR STATE WATER BOARD L	JSE ONLY		_ >
WDID:	Date NOI Received:	Date NOI Processed:	-
Case Handler's Initial:	Fee Amount Received:	Check #:	<b> </b> <

# Alameda County Mosquito Abatement District

BOARD OF TRUSTEES
Marisel Brown, President
Jan O. Washburn, Vice-President
Jim Prole, Secretary
Dennis Bray
Edgar I. Centeno
James N. Doggett
T. David Edwards
Jim Golden
Barbara Halliday
John D. Hughes
James Kohnen
Denny McLeod
Ronald E. Quinn
William M. Spinola

John R. Rusmisel
District Manager
acmad@mosquitoes.org

RECEIVED MAR 0 3 2011

DIVISION OF WATER QUALITY

March 3, 2011

## Annual Statement of Intent to apply pesticides

On March 1, 2011 the State Water Board adopted a new Statewide National Pollutant Discharge Elimination System Permit for Residual Pesticide Discharges to Waters of the United States from Vector Control Applications.

The permit requires the District to provide an annual notice of our intent to discharge pesticides to potentially affected governmental agencies. Since the Alameda County Mosquito Abatement District may potentially treat anywhere within the boundary of Alameda County on any given day during the year we are notifying the County and all cities within Alameda County as well as Special Districts such as Park and Sanitary Districts.

ACMAD typically uses larvicides for the purpose of reducing mosquito populations. The larvicides can be broken down into several groups, bacterial products, insect growth regulators and larviciding oil. Several times a year it is necessary for the district to use adulticides to control an outbreak of mosquitoes. These pesticides are synthetic pyrethroids.

Sources treated with the pesticides used by the District require no additional restrictions or precautions to be taken by your employees or the public.

A complete list of all pesticides used by the District along with the EPA registration numbers are listed on the back of this page.

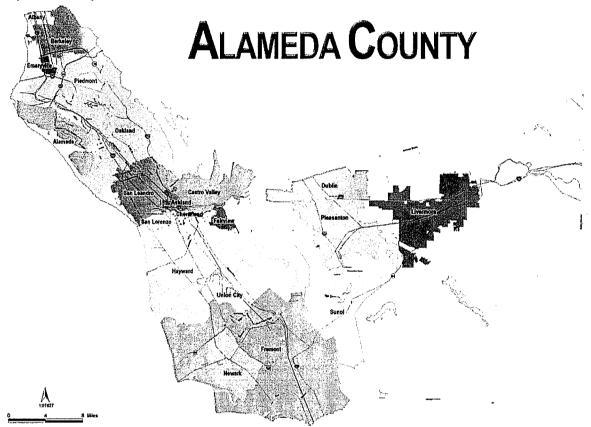
Any questions regarding this statement can be directed to District Manager, John R. Rusmisel at (510) 783-7744 or via email at acmad@mosquitoes.org.

·	•	· ·
•		
Pesticide Name	Common Name	EPA#
+ Colloide Hairie	Bacillus sphaericus 7.5%	L1 / \ #
Vectolex CG Biologic	granule	275-77
voololox oo blologio	Bacillus thuringiensis	21011
Vectobac 12AS	israelensis 1.2% Liquid	275-66
	Bacillus thuringiensis	
Vectobac G	israelensis 0.2% granule	275-50
	Bacillus sphaericus 7.5%	· · · · · ·
,	granule in water soluble	
Vectolex WSP	packets	73049-20
•	Bacillus sphaericus 2.7%	
	and Bacillus thuringiensis	
VectoMAX CG	israelensis 4.5% granules	73049-429
•	Bacillus sphaericus 51.2%	
Vectolex WDG	water dispersable granule	73049-57
	Bacillus thuringiensis	
	israelensis 7% 150 day	
FourStar 150 Bti	briquet	69504-2
	Bacillus thuringiensis	•
	israelensis 7% 45 day	
	briquet	69504-2
	Bacillus sphaericus 6% Bti	
FourStar 180 Bs	1% 180 day briquet	83362-3
Agnique MMF	water soluable surface film	2302-14 2724-375-64833
Altosid Briquets Altosid XR Briquets	methoprene 7.9% 30 day methoprene 2.1% 150 day	2724-375-64833
	methoprene 20% liquid	: 212 <del>4-1</del> 21-04033
Altosid Liquid conc	conc	2724-446-64833
, moora Liquia cono	methoprene 4% pellet 30	
Altosid Pellets	days	2724-448-50809
	methoprene 1.5% granule	
Altosid XR-G	21 days	2724-451
	methoprene 4.25% granule	:
•	in water soluble packs 30	·
Altosid WSP	days	2724-448
	methoprene 0.2% granule 5-	
Altosid SBG	10 days	2724-489
· ·	Spinosad 6.25% tablets 180	•
		8329-82
	Spinosad 2.5% granules 30	
Natular G30	a financia de la compansión de la compan	8329-83
	Aliphatic Petroleum	0000 40
	Hydrocarbons	8898-16
Bva 2		70589-1
Socurac 40/	4.14% Resmethrin 12.42%	432-716
Scourge 4%	Piperonyl Butoxide 18% Resmethrin 54%	<del>1</del> 32-7 10
Scourge 18%	Piperonyl Butoxide	432-667
Coodige 1070	i ipololly i butoxide	<del></del>

# Alameda County Mosquito Abatement District – Pesticide Application Plan (PAP) March 2011

a. Description of the target area and adjacent areas, if different from the water body of the target area;

All aquatic sources in Alameda County are potential targets for pesticide applications it there are mosquito larvae present.



b. Discussion of the factors influencing the decision to select pesticide applications for mosquito control;

Please see the Best Management Practices for Mosquito Control in California

c. Type(s) of pesticides used, the method in which they are applied, and if applicable, the adjuvants and surfactants used;

Please see the Best Management Practices for Mosquito Control in California

d. Description of the types and locations of the anticipated application area\* and the target area to be treated by the Discharger, recognizing that, with vector control, the precise locations may not be known until after surveillance;

Any site that holds water for more than 96 hours (4 days) can produce mosquitoes. Source reduction is the District's preferred solution, and whenever possible the District works with property owners to effect long-term solutions to reduce or eliminate the need for

continued applications as described in Best Management Practices for Mosquito Control in California. The typical sources treated by this District include:

Agricultural	Natural	Domestic	Commercial
Stock Ponds	Creeks	Fish ponds	Catch basin
Duck Ponds	Creek potholes	Septic tanks	Storm drain
Agricultural drains	Marsh, tidal	Wells	Gravel pit
Watering troughs	Marsh, reclaimed	Swimming pools	Ditch
	Marsh, fresh	Spa	Sewer pond
	Lakes	Bird baths	Utility vaults
	Ponds	Flooded basement	Cemetery urns
	Tree holes	Containers	Sumps
	Rain pools	Overwatering	Sewer lines
	Seepage		Canal
	·		Used tires
			Broken pipes

### e. Other control methods used (alternatives) and their limitations;

With any mosquito or other vector source, the District's first goal is to look for ways to eliminate the source, or, if that is not possible, for ways to reduce the vector potential. The most commonly used methods and their limitations are included in the Best Management Practices for Mosquito Control in California.

Specific methods used by the District include stocking mosquito fish (*Gambusia affinis*), educating residents that mosquitoes develop in standing water and encouraging them to remove sources of standing water on their property, and working with property owners to find long-term water management strategies that meet their needs while minimizing the need for public health pesticide applications.

f. Approximately how much product is anticipated to be used and how this amount was determined

**Treatments applied in Alameda County 2010** 

Amount	Area treated	Applic Rate	No. of Applic.
20 oz	3089.0 sq ft	284.7 fl oz/acre	22
652 oz	2.2 acre	299.0 oz/acre	146
825 oz	824.6 acre	1.0 fl oz/acre	151
3803 oz	113.3 acre	33.6 oz/acre	87
22 oz	2.0 acre	11.1 oz/acre	6
4358 oz	5.8 acre	571.4 oz/acre	429
432 oz	11.0 acre	39.3 oz/acre	1
47 gal	15.7 acre	3.0 gal/acre	14
1898 gal	530.4 acre	3.6 gal/acre	751
16 lb	0.2 acre	92.4 lb/acre	9
11 oz	13.5 acre	0.8 fl oz/acre	2
122 gal	1237.3 acre	0.1 gal/acre	. 362
5500 lb	609.8 acre	9.0 lb/acre	597
2994 lb	283.3 acre	10.6 lb/acre	706
251 lb	631.2 acre	0.4 lb/acre	347
81 lb	133.1 acre	0.6 lb/acre	467
271 lb	22.6 acre	12.0 lb/acre	41
	20 oz 652 oz 825 oz 3803 oz 22 oz 4358 oz 432 oz 47 gal 1898 gal 16 lb 11 oz 122 gal 5500 lb 2994 lb 251 lb	20 oz 3089.0 sq ft 652 oz 2.2 acre 825 oz 824.6 acre 3803 oz 113.3 acre 22 oz 2.0 acre 4358 oz 5.8 acre 432 oz 11.0 acre 47 gal 15.7 acre 1898 gal 530.4 acre 16 lb 0.2 acre 11 oz 13.5 acre 122 gal 1237.3 acre 5500 lb 609.8 acre 2994 lb 283.3 acre 251 lb 631.2 acre 81 lb 133.1 acre	20 oz       3089.0 sq ft       284.7 fl oz/acre         652 oz       2.2 acre       299.0 oz/acre         825 oz       824.6 acre       1.0 fl oz/acre         3803 oz       113.3 acre       33.6 oz/acre         22 oz       2.0 acre       11.1 oz/acre         4358 oz       5.8 acre       571.4 oz/acre         432 oz       11.0 acre       39.3 oz/acre         47 gal       15.7 acre       3.0 gal/acre         1898 gal       530.4 acre       3.6 gal/acre         16 lb       0.2 acre       92.4 lb/acre         11 oz       13.5 acre       0.8 fl oz/acre         122 gal       1237.3 acre       0.1 gal/acre         5500 lb       609.8 acre       9.0 lb/acre         2994 lb       283.3 acre       10.6 lb/acre         251 lb       631.2 acre       0.4 lb/acre         81 lb       133.1 acre       0.6 lb/acre

g. Representative monitoring locations\* and the justification for selecting these monitoring locations

Please see the MVCAC NPDES Coalition Monitoring Plan

h. Evaluation of available BMPs to determine if there are feasible alternatives to the selected pesticide application project that could reduce potential water quality impacts; and

Please see the Best Management Practices for Mosquito Control in California

- i. Description of the BMPs to be implemented
   Please see the Best Management Practices for Mosquito Control in California
- 2. The Discharger shall update the PAP periodically and submit the revised PAP to the State Water Board for approval if there are any changes to the original PAP.
- D. Best Management Practices (BMPs)

The Discharger shall develop BMPs that contain the following elements:

The District's BMPs are described in the Best Management Practices for Mosquito Control in California and the California Mosquito-borne Virus Surveillance and Response Plan.

- 1. Identify the Problem
  - Prior to first pesticide application covered under this General Permit that will result in a discharge of residual pesticides to waters of the US, and at least once each calendar year thereafter prior to the first pesticide application for that calendar year, the Discharger must do the following for each vector management area:
  - a. Establish densities for larval and adult vector populations to serve as action threshold(s) for implementing pest management strategies

Only those mosquito sources that District staff determine to represent imminent threats to public health or quality of life are treated. The presence of any mosquito may necessitate treatment, however higher thresholds may be applied depending on the District's resources, disease activity, or local needs. Treatment thresholds are based on a combination of one or more of the following criteria:

- Mosquito species present
- Mosquito stage of development
- Pest, nuisance, or disease potential
- Disease activity
- Mosquito abundance
- Flight range
- Proximity to populated areas
- Size of source
- Presence/absence of natural enemies or predators
- Presence of sensitive/endangered species or habitats.
- b. Identify target vector species to develop species-specific pest management strategies based on developmental and behavioral considerations for each species;

Please see the Best Management Practices for Mosquito Control in California and the California Mosquito-borne Virus Surveillance and Response Plan.

c. Identify known breeding areas for source reduction, larval control program, and habitat management; and

Any site that holds water for more than 96 hours (4 days) can produce mosquitoes. Source reduction is the District's preferred solution, and whenever possible the District works with property owners to implement long-term solutions to reduce or eliminate the need for continued applications as described in Best Management Practices for Mosquito Control in California.

d. Analyze existing surveillance data to identify new or unidentified sources of vector problems as well as areas that have recurring vector problems.

This is included in the Best Management Practices for Mosquito Control in California and the California Mosquito-borne Virus Surveillance and Response Plan that the Districts uses. The District continually collects adult and larval mosquito surveillance data, dead bird reports, and sentinel chicken test results and uses them to guide mosquito control activities.

2. Examine the Possibility of Alternatives to Treatments
Dischargers should continue to examine the possibility of alternatives to reduce the need for applying larvicides that contain temephos and for spraying adulticides. Such methods include:

- a. Evaluating management and treatment options that may impact water quality, non-target organisms, vector resistance, feasibility, and cost effectiveness, such as:
  - No action
  - o Source prevention
  - Mechanical or physical source reduction methods
  - Cultural methods
  - Biological control agents
  - Pesticides
- b. Applying pesticides only when vectors are present at a level that will constitute a nuisance or threat to public health
- c. Using the least intrusive method of pesticide application.
- d. Public education efforts to reduce potential vector breeding habitat.
- e. Applying a decision matrix concept to the choice of the most appropriate formulation.

This describes the District's existing integrated vector management (IVM) program, as well as the practices described in the California Mosquito-borne Virus Surveillance and Response Plan and Best Management Practices for Mosquito Control in California that are used by this agency.

#### 3. Correct Use of Pesticides

Users of pesticides must ensure that all reasonable precautions are taken to minimize the impacts caused by pesticide applications. Reasonable precautions include using the proper spraying techniques and equipment, taking account of weather conditions and the need to protect the environment.

- a. All errors in application and spills are reported to the proper authority.
- b. Staff training in the proper application of pesticides and handling of spills.

This is an existing practice of the District, and is required to comply with the Department of Pesticide Regulation's (DPR) requirements and the terms of our California Department of Public Health (CDPH) Cooperative Agreement. All pesticide applicators receive annual safety and spill training in addition to their regular continuing education.

### E. Pesticide Application Log

The Discharger shall maintain a log for each pesticide application. The application log shall contain, at a minimum, the following information, when practical, for larvicide or adulticide applications:

- 1. Date of application;
- 2. Location of the application and target areas (e.g., address, crossroads, or map coordinates);
- 3. Name of applicator;
- 4. The names of the water bodies treated if known/ named(i.e., canal, creek, lake, etc.);
- 5. Application details, such as when the application started and stopped, pesticide application rate and concentration, water flow rate of the target area, surface water area, volume of water treated, pesticide(s) and adjuvants used by the Discharger, and volume or mass of each component discharged;

This is an existing practice of the District as required to comply with DPR regulations and our CDPH Cooperative Agreement requirements.

#### References:

- Best Management Practices for Mosquito Control in California. 2010. Available by download from the California Department of Public Health—Vector-Borne Disease Section at <a href="http://www.cdph.ca.gov/HealthInfo/discond/Pages/MosquitoBorneDiseases.aspx">http://www.cdph.ca.gov/HealthInfo/discond/Pages/MosquitoBorneDiseases.aspx</a> or <a href="http://www.westnile.ca.gov/resources.php">http://www.westnile.ca.gov/resources.php</a> under the heading Mosquito Control and Repellent Information. Copies may be also requested by calling the California Department of Public Health—Vector-Borne Disease Section at (916) 552-9730 or the Alameda County Mosquito Abatement District at (510) 783-7744.
- California Mosquito-borne Virus Surveillance and Response Plan. 2010. [Note: this document is updated annually by CDPH]. . Available by download from the California Department of Public Health—Vector-Borne Disease Section at <a href="http://www.cdph.ca.gov/HealthInfo/discond/Pages/MosquitoBorneDiseases.aspx">http://www.cdph.ca.gov/HealthInfo/discond/Pages/MosquitoBorneDiseases.aspx</a> or <a href="http://www.westnile.ca.gov/resources.php">http://www.westnile.ca.gov/resources.php</a> under the heading Response Plans and Guidelines. Copies may be also requested by calling the California Department of Public Health—Vector-Borne Disease Section at (916) 552-9730 or the Alameda County Mosquito Abatement District at (510) 783-7744.
- MVCAC NPDES Coalition Monitoring Plan. 2011. This plan is in development and the MVCAC will be forwarding to the State Water Board soon.